Caldwell County Natural Area Inventory

MULBERRY CREEK RARE PLANT SITE Significant Natural Heritage Area

Site Significance: State **Size:** 167 acres

Quadrangle: Lenoir **Ownership:** U.S. Forest Service and Private

SIGNIFICANT FEATURES: This site contains one of the best populations of the State Endangered and Federal Species of Concern mountain heartleaf (*Hexastylis contracta*) in North Carolina.

LANDSCAPE RELATIONSHIPS: This site is located in northern Caldwell County along the eastern part of the Pisgah National Forest. Buffalo Cove Forests lies 2.8 miles to the northeast and the Johns River/Mulberry Creek Aquatic Habitat lies 1.4 miles to the southwest (Mulberry Creek) and 3.8 miles to the west (Johns River).

SITE DESCRIPTION: This site is located along the edge of the Blue Ridge Escarpment. The topography consists of low mountains with long narrow ridgelines generally running southward off the escarpment to the western Piedmont.

On lower slopes and in sheltered coves, Acidic Cove Forest is found. It contains a fairly large population of mountain heartleaf in middle-aged to mature forest. This type of habitat is rather extensive in the region, so it may be locally abundant and occur in other yet unknown locations. The canopy consists of mixed mesophytic tree species that include tulip poplar (*Liriodendron tulipifera*), Carolina silverbell (*Halesia tetraptera*), sweet birch (*Betula lenta*), and an occasional basswood (*Tilia americana* var. *heterophylla*). The understory is fairly well-defined with ironwood (*Carpinus caroliniana*), sourwood (*Oxydendron arboreum*), and black gum (*Nyssa sylvatica*) common. Shrubs are often very dense along the streams, with patches of mountain laurel (*Kalmia latifolia*) upslope in slightly drier habitat. Great laurel (*Rhododendron maximum*), flame azalea (*R. calendulaceum*), and blueberries (*Vaccinium* spp.) are common. Virginia creeper (*Parthenocissus quinquefolia*), poison ivy (*Toxicodendron radicans*), and cross-vine (*Bignonia capreolata*) comprise the majority of woody vines. The herbaceous layer is fairly diverse and lush, with downy rattlesnake plantain (*Goodyera pubescens*), turtlehead (*Chelone* sp.), Robin's-plantain (*Erigeron pulchellus*), foamflower (*Tiarella cordifolia*), and Christmas fern (*Polystichum acrostichoides*) present.

Dominating the majority of the site, Chestnut Oak Forest occurs along drier middle and upper slopes and ridgelines. It has a closed canopy with chestnut oak (*Quercus montana*), scarlet oak (*Q. coccinea*), shortleaf pine (*Pinus echinata*), and mockernut hickory (*Carya alba*). The understory is sparse, with red maple (*Acer rubrum*), sourwood (*Oxydendrum arboreum*), and mountain holly (*Ilex montana*). Mountain laurel occurs in patches in the shrub layer along with highbush